

Form PTO-1449		Docket Number: 0063.024	Application Number: 08/441,443
INFORMATION DISCLOSURE CITATION IN AN APPLICATION		Applicant Houghton, et al.	
(Use several sheets if necessary)		Filing Date: May 15, 1995	Group Art Unit: 1815

U.S. PATENT DOCUMENTS							
Examiner Initials	Ref. No.	Date	Document No.	Name	Class	Subclass	Filing Date If Appropriate
MKZ	I.A.143	04/21/92	5,106,726	Wang, Chang Y.	435	5	
MKZ	I.A.144	07/25/95	5,436,126	Wang, Chang Y.	435	5	
MKZ	I.B.13.	1990	4,891,313	Berger, et al.	435	7.94	
MKZ	I.B.52.	1987	4,659,678	Forrest, et al.	436	512	
MKZ	I.B.76.	1991	5,077,193	Mishiro, et al.	435	5	
MKZ	I.B.78.	07/28/87	4,683,195	Mullis, et al.	435	6	
MKZ	I.B.79.	07/28/87	4,683,202	Mullis, et al.	435	91.2	
MKZ	I.B.102.	1987	4,673,634	Seto, et al.	424	325.1	
MKZ	I.B.116.	1987	4,702,909	Villarejos, et al.	435	5	
MKZ	I.B.162.	03/02/93	5,191,064	Arima, et al.	530	324	
MKZ	I.B.163.	06/08/93	5,218,099	Reyes, et al.	536	23.72	

FOREIGN PATENT DOCUMENTS							
Examiner Initials	Ref. No.	Date	Document No.	Country	Class	Subclass	Translation YES NO
MKZ	I.A.4.	06/29/89	WO 89/05855-A	PCT	—	—	
MKZ	I.A.18.	01/07/93	WO 93/00365	PCT	—	—	
MKZ	I.A.19.	12/18/90	58123/90	Australia	—	—	
MKZ	I.A.27.	11/30/88	88400790.7	Europe	—	—	
MKZ	I.A.39.	06/26/91	GB 2,239,245 A	Great Britain	—	—	
MKZ	I.A.40.	11/15/93	5-81600	Japan	—	—	X
MKZ	I.A.41.	06/01/89	WO 89/04669	PCT	—	—	
MKZ	I.A.42.	10/04/90	WO 90/11089	PCT	—	—	
MKZ	I.A.43.	11/29/90	WO 90/14436	PCT	—	—	
MKZ	I.A.54.	03/29/90	02-500880	Japan	—	—	X
MKZ	I.A.55.	11/16/89	89/10967	Australia	—	—	
MKZ	I.A.59.	11/29/89	36979/89	Australia	—	—	
MKZ	I.A.131.	09/04/91	0293274	Europe	—	—	
MKZ	I.A.132.	11/16/89	WO 89/10967	PCT	—	—	

EXAMINER: <i>Mary Zeman</i>	DATE CONSIDERED: <i>7/2/97</i>
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Examiner Initials	Ref. No.	Date	Document No.	Country	Class	Subclass	Translation YES NO
MKB	I.A.142	08/21/91	EP 0442394 A2	Europe	—	—	
MKB	I.A.145	01/29/92	EP 0468527 A2	Europe	—	—	
MKB	I.B.6.	10/26/83	JP 183629/1983	Japan	—	—	X
MKB	I.B.36.	1982	WO 82/00205	PCT	—	—	
MKB	I.B.53.	1987	WO 87/05930	PCT	—	—	
MKB	I.B.61.	06/26/91	2,239,245	Great Britain	—	—	
MKB	I.B.64.	05/31/89	EP 0318216	Europe	—	—	
MKB	I.B.65.	09/19/90	EP 0388232	Europe	—	—	
MKB	I.B.74.	1982	WO 82/02774	PCT	—	—	
MKB	I.B.87.	08/10/88	EP 0277437	Europe	—	—	X
MKB	I.B.88.	05/19/88	WO 88/03410	PCT	—	—	X
MKB	I.B.91.	1991	WO 91/15516	PCT	—	—	
MKB	I.B.98.	1988	EP 0279460	Europe	—	—	X
MKB	I.B.100	1986	EP 0194207	Europe	—	—	
MKB	I.B.104	04/13/88	EP 0263761	Europe	—	—	
MKB	I.B.113.	1982	EP 0061974	Europe	—	—	
MKB	I.B.114	1982	WO 82/03330	PCT	—	—	X
MKB	I.B.150	07/01/92	77108060	Taiwan	—	—	X
MKB	I.B.153	01/22/92	2,212,511	United Kingdom	—	—	

OTHER DOCUMENTS

(including author, title, Date, Pertinent Pages, Etc.)

Examiner Initials	Ref. No.	Title
MKB	I.A.1.	Arrand, et al., "Molecular Cloning of the Complete Epstein-Barr Virus Genome as a Set of Overlapping Restriction Endonuclease Fragments," <u>Nucleic Acids Res.</u> 9(13):2999-3014 (1981)
MKB	I.A.2.	Baer, et al., "DNA Sequence and Expression of the B95-8 Epstein-Barr Virus Genome," <u>Nature</u> 310:207-211 (1984)
MKB	I.A.3.	Bankier, et al., "Sequence Analysis of the 17,166 Base-Pair EcoRI Fragment C of B95-8 Epstein-Barr Virus," <u>Mol. Biol. Med.</u> 1:21-45 (1983)
MKB	I.A.5.	Beck, et al., "Human Cytomegalovirus Encodes a Glycoprotein Homologous to MHC Class-I Antigens," <u>Nature</u> 331:269-272 (1988)
MKB	I.A.6.	Mierendorf, et al., "Gene Isolation by Screening λgt11 Libraries With Antibodies," <u>Methods In</u>

EXAMINER: <i>Mary KB</i>	DATE CONSIDERED: <i>7/2/92</i>
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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
		<u>Enzymology</u> , Ch. 51, 152 , Berger & Kimmel (Eds), Academic Press Ltd. (1987)
MKZ	I.A.7.	Biggin, et al., "Transcription and DNA Sequence of the Bamhi L Fragment of B95-8 Epstein-Barr Virus," <u>EMBO J.</u> 3 (5):1083-1090 (1984)
MKZ	I.A.8.	Billeter, et al., "Cloning of DNA Corresponding to Four Different Measles Virus Genomic Regions," <u>Virology</u> 132 :147-159 (1984)
MKZ	I.A.9.	Blumberg, "Australia Antigen and Biology of Hepatitis B," <u>Science</u> 197 :17-25 (1977)
MKZ	I.A.10.	Bodescot, et al., "Clustered Alternative Splice Sites In Epstein-Barr Virus Rnas," <u>Nucleic Acids Res.</u> 15 :5887 (1987)
MKZ	I.A.11.	Boss, et al., "Cloning and Sequence Analysis of the Human Major Histocompatibility Complex Gene DC-3θ," <u>Proc. Natl. Acad. Sci. USA</u> 81 :5199-5203 (1984)
MKZ	I.A.12.	Bradley, "Research Perspectives in Posttransfusion Non-A, Non-B Hepatitis," <u>Infection, Immunity and Blood Transfusion</u> , (Dodd, R.Y. & Barker, L.F. (Eds.), Alan R. Liss Inc.) Pp. 81-97 (1985)
MKZ	I.A.13.	Bradley, et al., "Transmission, Etiology and Pathogenesis of Viral Hepatitis Non-A, Non-B in Non-Human Primates," <u>Adv. Hepat. Res.</u> Ch.31 pp. 268-280 (1984)
MKZ	I.A.14.	Bradley, et al., "Posttransfusion Non-A, Non-B Hepatitis: Physicochemical Properties of Two Distinct Agents," <u>J. Infect. Dis.</u> 148 (2):254-265 (1983)
MKZ	I.A.15.	Burrell, et al., "Expression in Escherichia Coli of Hepatitis B Virus DNA Sequences Cloned in Plasmid Pbr322," <u>Nature</u> 279 :43-47 (1979)
MKZ	I.A.16.	Chan, et al., "Serological Responses to Infection with Three Different Types of Hepatitis C Virus," <u>The Lancet</u> 338 :1391 (1991)
MKZ	I.A.17.	Charnay, et al., "Biosynthesis of Hepatitis B Virus Surface Antigen in Escherichia coli," <u>Nature</u> 286 :893-895 (1980)
MKZ	I.A.20.	Daniels, et al., "A Second Major Class of Alu Family Repeated DNA Sequences in a Primate Genome," <u>Nucleic Acids Res.</u> 11 (21):7595-7610 (1983)
MKZ	I.A.21.	Davies (ed.), <u>Amino Acids and Peptides</u> , (Chapman and Hall, London, 1985)
MKZ	I.A.22.	Davis, et al., "Isolation of cDNA Clones for Differentially Expressed Genes of the Human Parasite Schistosoma Mansoni," <u>Proc. Natl. Acad. Sci. USA</u> 83 :5534-5538 (1986)
MKZ	I.A.23.	Davison, et al., "The Complete DNA Sequence of Varicella-Zoster Virus," <u>J. Gen. Virol.</u> 67 :1759-1816 (1986)
MKZ	I.A.24.	Deininger, et al., "Sequence Analysis and in Vitro Transcription of Portions of the Epstein-Barr Virus Genome," <u>J. Cell Biochem.</u> 19 :267-274 (1982)
MKZ	I.A.25.	Dull, et al., "Insulin-Like Growth Factor II Precursor Gene Organization in Relation to Insulin Gene Family," <u>Nature</u> 310 :777-781 (1984)
	I.A.26.	Emtage, et al., "Influenza Antigenic Determinants Are Expressed From Haemagglutinin Genes
EXAMINER: <i>Mankoski</i>	DATE CONSIDERED: <i>7/3/97</i>	
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OTHER DOCUMENTS (including author, title, Date, Pertinent Pages, Etc.)		
Examiner Initials	Ref. No.	Title
		Cloned in Escherichia coli," <u>Nature</u> 283 :171-174 (1980)
MKB	I.A.28.	Farci, et al., "A Long-Term Study of Hepatitis C Virus Replication In Non-A, Non-B Hepatitis," <u>New Eng. J. Med.</u> 325 (2):96-104 (1991)
MKB	I.A.29.	Farrell, et al., "Latent and Lytic Cycle Promoters of Epstein-Barr Virus," <u>EMBO J.</u> 2 (8):1331-1338 (1983)
MKB	I.A.30.	Farrell, et al., "Homologous Upstream Sequences Near Epstein-Barr Virus Promoters," <u>Proc. Natl. Acad. Sci. USA</u> 80 :1565-1569 (1983)
MKB	I.A.31.	Feinstone, et al., "Transfusion-Associated Hepatitis Not Due To Viral Hepatitis Type A Or B," <u>New England J. Med.</u> 292 (15):767-770 (1975)
MKB	I.A.32.	Forsgren, et al., "Molecular Cloning and Characterization of A Full-Length cDNA Clone for Human Plasminogen," <u>FEBS Lett.</u> 213 (2):254-260 (1987)
MKB	I.A.33.	Geysen, et al., "A Priori Delineation of A Peptide Which Mimics A Discontinuous Antigenic Determinant," <u>Mol. Immunol.</u> 23 :709-715 (1986)
MKB	I.A.34.	Gibson, et al., "Homology Between Two EBV Early Genes and HSV Ribonucleotide Reductase and 38K Genes," <u>Nucleic Acids Res.</u> 12 (12):5087-5099 (1984)
MKB	I.A.35.	Gilmore, et al., "The Nucleocapsid Gene of Infectious Hematopoietic Necrosis Virus, A Fish Rhabdovirus," <u>Virology</u> 167 :644-648 (1988)
MKB	I.A.36.	Glover (ed), <u>DNA Cloning 1: A Practical Approach</u> , (IRL Press, Washington DC, USA) (1985)
MKB	I.A.37.	Gross, et al., (eds), <u>The Peptides</u> , (Academic Press, New York, 1983)
MKB	I.A.38.	Habets, et al., <u>HCV Antibodies React with Ross River Virus Peptide</u> , (8/25/94)
MKB	I.A.44.	U.K. High Court Judgment in Chiron vs. Organon, Akzo Pharma, and UBI and Chiron vs. Murex (November 2, 1995)
MKB	I.A.45.	U.K. Appeals Court Judgment in Chiron vs. Organon, Akzo Pharma, and UBI and Chiron vs. Murex (October 5, 1993)
MKB	I.A.46.	Houghton, et al., "Molecular Biology of the Hepatitis C Viruses: Implications for Diagnosis, Development and Control of Viral Disease," <u>Hepatology</u> 14 :381-388 (1991)
MKB	I.A.47.	Ishida, et al., "Sequence of 2,617 Nucleotides From the 3' End of Newcastle Disease Virus Genome RNA and the Predicted Amino Acid Sequence of Viral NP Protein," <u>Nucleic Acids Res.</u> 14 (16):6551-6564 (1986)
MKB	I.A.48.	Jeang, et al., "Organization of the Epstein-Barr Virus DNA Molecule. III. Location of the P3hr-1 Deletion Junction and Characterization of the <i>NotI</i> Repeat Units That Form Part of the Template for An Abundant 12-O-Tetradecanoylphorbol-13-Acetate-Induced mRNA Transcript," <u>J. Virol.</u> 48 (1):135-148 (1983)
MKB	I.A.49.	Jones, et al., "The EB Virus Genome In Daudi Burkitt's Lymphoma Cells Has A Deletion Similar To That Observed In A Non-Transforming Strain (P3HR-1) of the Virus," <u>EMBO J.</u> 2 :137-144 (1983)

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Examiner Initials	Ref. No.	Title
	J. 3(4):813-821 (1984)	
MKB	I.A.50.	Kemp, et al., "Direct Immunoassay for Detecting <i>Escherichia Coli</i> Colonies That Contain Polypeptides Encoded By Cloned DNA Segments," <u>Proc. Natl. Acad. Sci. USA</u> 78(7):4520-4524 (1981)
MKB	I.A.51.	Kilejian, et al., "Histidine-Rich Domain of the Knob Protein of the Human Malaria Parasite <i>Plasmodium Falciparum</i> ," <u>Proc. Natl. Acad. Sci. USA</u> 83:7938-7941 (1986)
MKB	I.A.52.	Kozak, "Possible Role of Flanking Nucleotides In Recognition of the AUG Initiator Codon By Eukaryotic Ribosomes," <u>Nucleic Acids Res.</u> 9(20):5233-5252 (1981)
MKB	I.A.53.	Krissansen, et al., "Primary Structure of the T3 K Subunit of the T3/T Cell Antigen Receptor Complex Deduced From Cdna Sequences: Evolution of the T3 K and A Subunits," <u>EMBO J.</u> 5(8):1799-1808 (1986)
MKB	I.A.56.	Ladin, et al., "Characterization of A cDNA Encoding Ricin E, A Hybrid Ricin- <i>Ricinus Communis</i> Agglutinin Gene From the Castor Plant <i>Ricinus Communis</i> ," <u>Plant Mol. Biol.</u> 9:287-295 (1987)
MKB	I.A.57.	Laux, et al., "A Spliced Epstein-Barr Virus Gene Expressed In Immortalized Lymphocytes Is Created By Circularization of the Linear Viral Genome," <u>EMBO J.</u> 7(3):769-774 (1988)
MKB	I.A.58.	Legouy, et al., "Structure and Expression of the Murine L-Myc Gene," <u>EMBO J.</u> 6(11):3359-3366 (1987)
MKB	I.A.60.	Malby, et al., "The Structure of A Complex Between the NC10 Antibody and Influenza Virus Neuraminidase and Comparison With the Overlapping Binding Site of the NC41 Antibody," <u>Structure</u> 2:733-746 (1994)
MKB	I.A.61.	Maniatis, et al., <u>Molecular Cloning: A Laboratory Manual</u> , Cold Spring Harbour Press, Cold Spring Harbour, NY (1982)
MKB	I.A.62.	Mason, et al., "Partial Nucleotide Sequence of the Japanese Encephalitis Virus Genome," <u>Virology</u> 158:348-360 (1987)
MKB	I.A.63.	May, et al., "Significance of Similarities In Patterns: An Application To & Interferon-Related DNA On Human Chromosome 2," <u>Proc. Natl. Acad. Sci. USA</u> 82:4090-4094 (1985)
MKB	I.A.64.	McOmish, et al., "Detection of Three Types of Hepatitis C Virus In Blood Donors: Investigation of Type-Specific Differences In Serologic Reactivity and Rate of Alanine Aminotransferase Abnormalities," <u>Transfusion</u> 33(1):7-13 (1993)
MKB	I.A.65.	McOmish, et al., "Geographical Distribution of Hepatitis C Virus Genotypes In Blood Donors: An International Collaborative Survey," <u>J. Clin. Microbiol.</u> 32(4):884-892 (1994)
MKB	I.A.66.	Kemp, et al., <u>Methods in Enzymology</u> , 79:622-630 (1981), published by Academic Press Inc.
MKB	I.A.67.	Molenaar, et al., "Structure and Organization of Two Linked Ribosomal Protein Genes In

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Examiner Initials	Ref. No.	Title
		"Yeast," <u>Nucl. Acids Res.</u> 12 (19):7345-7358 (1984)
<i>MKB</i>	I.A.68.	Murray, et al., "The Expression of Hepatitis B Virus Antigen Genes In Escherichia Coli," <u>Hepatitis B. Vaccine, INSERM Symposium No. 18</u> (Maupas, et al. eds.) pp. 289-304 (1981)
<i>MKB</i>	I.A.69.	Ogasawara, et al., "Genes and their Organization In the Replication Origin Region of the Bacterial Chromosome," <u>Mol. Microbiol.</u> 6 (5):629-634 (1992)
<i>MKB</i>	I.A.70.	Oram, et al., "Use of Recombinant Plasmids To Investigate the Structure of the Human Cytomegalovirus Genome," <u>J. Gen. Virol.</u> 59 :111-129 (1982)
<i>MKB</i>	I.A.71.	Pasek, et al., "Hepatitis B Virus Genes & their Expression In <i>E. Coli</i> ," <u>Nature</u> 282 :575-579 (1979)
<i>MKB</i>	I.A.72.	Prince, et al., <u>Viral Hepatitis</u> pp. 633-640 (The Franklin Press, 1978)
<i>MKB</i>	I.A.73.	Prince, et al., "Long-Incubation Post-Transfusion Hepatitis Without Serological Evidence of Exposure To Hepatitis-B Virus," <u>The Lancet</u> pp. 241-246 (August 3, 1974)
<i>MKB</i>	I.A.74.	Prince, et al., "Inactivation of Hepatitis B and Hutchinson Strain Non-A, Non-B Hepatitis Viruses By Exposure To Tween 80 and Ether," <u>Vox Sang</u> 46 :36-43 (1984)
<i>MKB</i>	I.A.75.	Reyes, et al., "Molecular Biology of Non-A, Non-B Hepatitis Agents: Hepatitis C and Hepatitis E Viruses," <u>Advances in Virus Research</u> 40 :57-102 (1991)
<i>MKB</i>	I.A.76.	Rice, et al., <u>Proc. Natl. Acad. Sci. USA</u> 78 :2062-2066 (1981)
<i>MKB</i>	I.A.77.	Sagar, et al., "Interferon- β -Related DNA Is Dispersed In the Human Genome," <u>Science</u> 223 :1312-1315 (1984)
<i>MKB</i>	I.A.78.	Seguin, et al., "DNA Sequence and Transcription of Bamhi Fragment B Region of B95-8 Epstein-Barr Virus," <u>Mol. Biol. Med.</u> 1 :369-392 (1983)
<i>MKB</i>	I.A.79.	Sehgal, et al., "Isolation of Novel Human Genomic DNA Clones Related To Human Interferon- β_1 Cdna," <u>Proc. Natl. Acad. Sci. USA</u> 80 :3632-3636 (1983)
<i>MKB</i>	I.A.80.	Shine, et al., "The 3'-Terminal Sequence of <i>Escherichia Coli</i> 16S Ribosomal RNA: Complementarity To Nonsense Triplets and Ribosome Binding Sites," <u>Proc. Natl. Acad. Sci. USA</u> 71 (4):1342-1346 (1974)
<i>MKB</i>	I.A.81.	Simmonds, et al., "Mapping of Serotype-Specific, Immunodominant Epitopes In the NS-4 Region of Hepatitis C Virus (HCV): Use of Type-Specific Peptides To Serologically Differentiate Infections With HCV Types 1, 2 and 3," <u>J. Clin. Microbiol.</u> 31 (6):1493-1503 (1993)
<i>MKB</i>	I.A.82.	Sprengel, et al., "Comparative Sequence Analysis of Defective and Infectious Avian Hepadnaviruses," <u>Nucleic Acids. Res.</u> 19 (15):4289 (1991)
<i>MKB</i>	I.A.83.	Staden, "Measurements of the Effects That Coding for A Protein Has On A DNA Sequence and their Use for Finding Genes," <u>Nucleic Acids Res.</u> 12 (1):551-567 (1984)

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MKB	I.A.84.	Strauss, et al., "Complete Nucleotide Sequence of the Genomic RNA of Sindbis Virus," <u>Virology</u> 133:92-110 (1984)
MKB	I.A.85.	Strauss, et al., "Sequence Coding for the Alphavirus Nonstructural Proteins Is Interrupted By An Opal Termination Codon," <u>Proc. Natl. Acad. Sci. USA</u> 80:5271-5275 (1983)
MKB	I.A.86.	Sudhof, et al., "cDNA and Derived Amino Acid Sequences for Rat and Human Synaptophysin," <u>Nucleic Acids Res.</u> 15(22):9607 (1987)
MKB	I.A.87.	Sugitani, et al., "Sensitivity of Serological Assays To Identify Blood Donors With Hepatitis C Viraemia," <u>The Lancet</u> 339:1018-1019 (1992)
MKB	I.A.88.	Takagi, et al., "Nucleotide Sequence and Promoter Region for the Neutral Protease Gene From <u>Bacillus Stearothermophilus</u> ," <u>J. Bacteriol.</u> 163(3):824-831 (1985)
MKB	I.A.89.	Takahashi, et al., "Complete Nucleotide Sequence of the Human Corticotropin- β -Lipotropin Precursor Gene," <u>Nucleic Acids Res.</u> 11(19):6847-6858 (1983)
MKB	I.A.90.	Takkinen, "Complete Nucleotide Sequence of the Nonstructural Protein Genes of Semliki forest Virus," <u>Nucl. Acids Res.</u> 14(14):5667-5682 (1986)
MKB	I.A.91.	Tamashiro, et al., "Structure of the Heterogeneous L-S Junction Region of Human Cytomegalovirus Strain AD169 DNA," <u>J. Virol.</u> 52(2):541-548 (1984)
MKB	I.A.92.	"Mysterious Strain of Hepatitis Is Identified," <u>The Wall Street Journal</u> , Friday, 21 April 1989
MKB	I.A.93.	Vallari, et al., "Serological Markers of Posttransfusional Hepatitis C Viral Infection," <u>J. Clin. Microbiol.</u> 30(3):552-556 (1992)
MKB	I.A.94.	Weston, et al., "Sequence of the Short Unique Region, Short Repeats, and Part of the Long Repeats of Human Cytomegalovirus," <u>J. Mol. Biol.</u> 192:177-208 (1986)
MKB	I.A.95.	Yang, et al., "Human Dihydrofolate Reductase Gene Organization. Extensive Conservation of the G+C-Rich 5' Non-Coding Sequence and Strong Intron Size Divergence From Homologous Mammalian Genes," <u>J. Mol. Biol.</u> 176:169-187 (1984)
MKB	I.A.96.	Yates, et al., "A Cis-Acting Element From the Epstein-Barr Viral Genome That Permits Stable Replication of Recombinant Plasmids In Latently Infected Cells," <u>Proc. Natl. Acad. Sci. USA</u> 81:3806-3810 (1984)
MKB	I.A.97.	Young, et al., "Efficient Isolation of Genes By Using Antibody Probes," <u>Proc. Natl. Sci. USA</u> 80:1194-1198 (1983)
MKB	I.A.98.	Suzuki, et al., "Characterization of A cDNA for Human Protein C Inhibitor," <u>J. Biol. Chem.</u> 262(2):611-616 (1987)
MKB	I.A.99.	First Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Steven Woodsmall (and translation) with supporting documents.
MKB	I.A.100.	Reply to First Opposition to Chiron Japanese Patent Application No. 01-500565

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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
MKB	I.A.101.	Second Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Akira Yamamoto (and translation) with supporting documents.
	I.A.102.	Reply to Second Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.103.	Third Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Asako Sudo (and translation) with supporting documents.
	I.A.104.	Reply to Third Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.105.	Fourth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Yashimi Tawara (and translation) with supporting documents.
	I.A.106.	Reply to Fourth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.107.	Fifth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Tetsuo Nakamura (and translation)
	I.A.108.	Reply to Fifth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.109.	Sixth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Toren K.K. (and translation) with supporting documents.
	I.A.110.	Reply to Sixth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.111.	Seventh Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Sumitomo Metal Industries, Ltd. (and translation) with supporting documents.
	I.A.112.	Reply to Seventh Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.113.	Eighth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Hiroshi Iino (and translation) with supporting documents.
	I.A.114.	Reply to Eighth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.115.	Ninth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Kyokuto Seiyaki Kogyo, Inc. (and translation) with supporting documents
	I.A.116.	Reply to Ninth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.117.	Tenth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by United Biomedical, Inc. (and translation) with supporting documents
	I.A.118.	Reply to Tenth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.119.	Eleventh Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Kokusai Shiyaku (and translation) with supporting documents
	I.A.120.	Reply to Eleventh Opposition to Chiron Japanese Patent Application No. 01-500565
✓	I.A.121.	Twelfth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Shigeo Kimura (and translation) with supporting documents.
MKB	I.A.122.	Reply to Twelfth Opposition to Chiron Japanese Patent Application No. 01-500565

EXAMINER:	<i>Mary KB</i>	DATE CONSIDERED: 7/3/97
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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
MKB	I.A.123.	Thirteenth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by Akzo Neamloze Venootschap (and translation)
	I.A.124.	Reply to Thirteenth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.125.	Fourteenth Opposition to Chiron Japanese Patent Application No. 01-500565, filed by F. Hoffman la Roche AG (and translation) with supporting documents
	I.A.126.	Reply to Fourteenth Opposition to Chiron Japanese Patent Application No. 01-500565
	I.A.127.	Translation of Decision on Opposition Against Patent Application No. 01-500565, issued 12/22/95.
	I.A.128.	Statement of Grounds for Opposition to Australian Patent No. 640,920, filed by Hoffman La Roche with supporting documents
	I.A.129.	Australian Litigation Bundle, for Chiron Australian Patent No. 624,105
	I.A.130.	Murex Reply in the Litigation of Chiron Australian Patent No. 624,105
	I.A.133.	First Opposition to Chiron European Application No. 0 318 216, filed by Akzo Pharma BV (01/27/94) with supporting documents
	I.A.134.	Second Opposition to Chiron European Application No. 0 318 216, filed by Murex Diagnostics Limited(09/12/94) with supporting documents
	I.A.135.	Third Opposition to Chiron European Application No. 0 318 216, filed by United Biomedical (09/15/94) with supporting documents
	I.A.136.	Fourth Opposition to Chiron European Application No. 0 318 216, filed by Beringwerke (09/15/94)
	I.A.137.	Fifth Opposition to Chiron European Application No. 0 318 216, filed by The Research Foundation for Microbial Diseases (09/14/94) with supporting documents
	I.A.138.	Sixth Opposition to Chiron European Application No. 0 318 216, filed by F. Hoffman-La Roche AG(09/15/94)
	I.A.139.	J.A. Kemp & Co.(Chiron): Response By Patentee To Notices of Opposition re EP 318 216, June 1995
	I.A.140.	Miscellaneous Documentation (believed to have been supplied to Prof. Donald Chisum by Dr. Bradley or the Center for Disease Control)
MKB	I.A.141.	Daniel W. Bradley v. Chiron Corporation, Civil Action No. 94-4342 Litigation Bundle, with supporting documents.
MKB	I.A.146.	[U.K. LITIGATION Bundle 1]
MKB	I.A.147.	[U.K. LITIGATION Bundle 2]
MKB	I.A.148.	[U.K. LITIGATION Bundle 5]
MKB	I.A.149.	[U.K. LITIGATION Bundle 6]
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OTHER DOCUMENTS (including author, title, Date, Pertinent Pages, Etc.)		
Examiner Initials	Ref. No.	Title
MKB	I.A.150.	[U.K. LITIGATION Bundle 7]
MKB	I.A.151.	[U.K. LITIGATION Bundle 7a]
MKB	I.A.152.	[U.K. LITIGATION Bundle 7b]
MKB	I.A.153.	[U.K. LITIGATION Bundle 7c]
MKB	I.A.154.	[U.K. LITIGATION Bundle 8]
MKB	I.A.155.	[U.K. LITIGATION Bundle 9]
MKB	I.A.156.	[U.K. LITIGATION Bundle 9.a.1]
MKB	I.A.157.	[U.K. LITIGATION Bundle 9.a.2]
MKB	I.A.158.	[U.K. Interlocutory Affidavits and Exhibits, Vol. 1]
MKB	I.A.159.	[U.K. Interlocutory Affidavits and Exhibits, Vol. 2]
MKB	I.A.160.	[U.K. Interlocutory Affidavits and Exhibits, Vol. 3]
MKB	I.A.161.	[U.K. Interlocutory Affidavits and Exhibits, Vol. 4]
MKB	I.A.162.	[U.K. Transcript Speeches and Evidence, Vol. 4]
MKB	I.B.1.	Bioindustry 3:302 (1986); (previously considered in US 08/103,961, reference I.A.1)
MKB	I.B.2.	Chiron News Release, "Chiron Clones Hepatitis Non-A, Non-B Virus Which May Allow Screening for Previously Undetectable Disease," No. 21 (May 10, 1988); (previously considered in US 07/456,637, reference OR; and US 08/103,961, reference I.B.3)
MKB	I.B.3.	Viral Hepatitis and Liver Disease 620 (1984); (previously considered in US 08/103,961, reference I.A.90)
MKB	I.B.4.	Winnacker, "From Genes to Clones Introduction to Gene Technology," (publ., VCH Germany, 1987), pp. 39-41; (previously considered in US 08/103,961, reference V.20)
MKB	I.B.5.	Aaskov, et al., "An Immunofluorescence Assay for Human Antibodies to Ross River Virus," J. Immu. Meth. 25:37-41 (1979); (previously considered in US 08/103,961, reference I.A.2)
MKB	I.B.7.	Alter, et al., "Detection of Antibody to Hepatitis C Virus in Prospectively Followed Transfusion Recipients with Acute and Chronic Non-A, Non-B Hepatitis," N. Engl. J. of Med. 321:1494-1500 (1989); (previously considered in US 07/456,637, reference IP; and US 08/103,961, reference I.B.24)
MKB	I.B.8.	Arikan, et al., "Sequences of the E. coli evrB Gene and Protein," Nucleic Acids Res. 14(6):2637 (1986); (previously considered in US 08/103,961, reference I.A.5)
MKB	I.B.9.	Arima, et al., "A Lambda gt11-cDNA Clone Specific for chronic Hepatitis C Generated from Pooled Clone Serum Presumably Infected by Hepatitis C Virus," Gastroenterol. Jpn. 24(5):545-548 (1989); (previously considered in US 07/456,637, reference IL; and US 08/103,961, reference I.B.31)

EXAMINER:

DATE CONSIDERED:

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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
MKB	I.B.10.	Arima, et al., "Cloning of a cDNA Associated with Acute and Chronic Hepatitis C Infection Generated from Patients Serum RNA," <u>Gastroenterol. Jpn.</u> 24 (5):540-544 (1989); (previously considered in US 07/456,637, reference IK; and US 08/103,961, reference I.B.33).
MKB	I.B.11.	Backendorf, et al., "Structure of the uvrB Gene of Escherichia coli. Homology with Other DNA Repair Enzymes and Characterization of the uvrB5 mutation," <u>Nucleic Acids Res.</u> 14 (7):2877-2890 (1986); (previously considered in US 08/103,961, reference I.A.9)
MKB	I.B.12.	Bankier, et al., "DNA Sequence Analysis of the EcoRI Dhet Fragment of B95-8 Epstein-Barr Virus Containing the Terminal Repeat Sequences," <u>Mol. Biol. Med.</u> 1 :425-445 (1983); (previously considered in US 08/103,961, reference I.A.11)
MKB	I.B.14.	Mierendorf, et al., "Gene Isolation by Screening Σgt11 Libraries with Antibodies," <u>Methods of Enzymology</u> , Chpt. 51, Vol. 152 (1987) Berger & Kimmel (eds): (previously considered in US 08/103,961, reference I.A.12)
MKB	I.B.15.	Bradley, "The Agents of Non-A, Non-B Viral Hepatitis," <u>J. Virol. Meth.</u> 10 :307-319 (1985); (previously considered in US 07/456,637, reference EK; and US 08/103,961, reference I.B.45)
MKB	I.B.16.	Bradley, et al., "Posttransfusional Non-A, Non-B Hepatitis in chimpanzees. Physiochemical Evidence that the Tubule-forming Agent is a Small Enveloped Virus," <u>Gastroenterology</u> 88 :773-779 (1985); (previously considered in US 07/456,637, reference DS; and US 08/103,961, reference I.B.51)
MKB	I.B.17.	Bradley, et al., "Posttransfusion Non-A, Non-B Hepatitis: Physiochemical Properties of Two Distinct Agents," <u>J. Infect. Dis.</u> 148 (2):254-265 (1983); (previously considered in US 07/456,637, reference CP; and US 08/103,961, reference I.B.55)
MKB	I.B.18.	Bradley, et al., "Experimental Infection of Chimpanzees with Antihemophilic (Factor VIII) Materials: Recovery of Virus-Like Particles Associated with Non-A, Non-B Hepatitis," <u>J. Med. Virol.</u> 3 :253-269 (1979); (previously considered in US 07/456,637, reference BP; and US 08/103,961, reference I.B.56)
MKB	I.B.19.	Bradley, et al., "Enterically Transmitted Non-A, Non-B Hepatitis: Serial Passage of Disease in Cynomolgus Macaques and Tamarins and Recovery of Disease-Associated 27 to 34nm Virus like Particles," <u>Proc. Natl. Acad. Sci. USA</u> 84 :6277-6281 (1987); (previously considered in US 07/456,637, reference FO, BBR; and US 08/103,961, reference I.B.59)
MKB	I.B.20.	Bradley, et al., "Hepatitis Non-A, Non-B Viruses Become Identified as Hepatitis C and E Viruses," <u>Prog. Med. Virol.</u> 37 :101-135 (1990); (cited by the examiner in 07/456,637, paper 23; and US 08/103,961, reference I.B.61)
MKB	I.B.21	Bradley, et al., "Etiology and Natural History of Post-Transfusion and Enterically-Transmitted Non-A, Non-B Hepatitis," <u>Seminars in Liver Disease</u> 6 (1):56-66 (1986); (previously considered in US 07/456,637, reference BL; and US 08/103,961, reference

EXAMINER: <i>MKB</i>	DATE CONSIDERED: <i>7/3/97</i>
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OTHER DOCUMENTS (including author, title, Date, Pertinent Pages, Etc.)				
Examiner Initials	Ref. No.	Title		
		I.B.62)		
MKB	I.B.22.	Bryan, "Viral Hepatitis. 1. Clinical and Laboratory Aspects and Epidemiology," <u>Interstate Postgrad. Med. USA</u> 68 (5):66-86; (previously considered in US 08/103,961, reference I.A.21)		
MKB	I.B.23.	Burk, et al., "Detection of Non-A, Non-B Hepatitis Antigen by Immunocytochemical Staining," <u>Proc. Natl. Acad. Sci. USA</u> 81 :3195-3199 (1984); (previously considered in US 07/456,637, reference GT; and US 08/103,961, reference I.B.69)		
MKB	I.B.24.	Burkhardt, et al., "Hepatitis Non-A, Non-B Associated Substance in Feces Identification and Cloning of a Partially Double-Stranded Circular DNA," <u>Immun. Infect.</u> 16 (3):91-96 (1988); (previously considered in US 07/456,637, reference OP; and US 08/103,961, reference I.B.70)		
MKB	I.B.25.	Burkhardt, et al., "Hepatitis Non-A, Non-B-associated DNA-Demonstration of the DNA in a proven infectious anti-D-immunoglobulin," <u>Immun. Infect.</u> 16 (3):97-99 (1988); (previously considered in US 07/456,637, reference OP; and US 08/103,961, reference I.B.71)		
MKB	I.B.26.	Butt (Ed.), <u>Practical Immunoassay: The State of the Art</u> , Chpt. 3, Vol. 14 (1984); (previously considered in US 08/103,961, reference I.A.24)		
MKB	I.B.27.	Buttner, et al., "The Agarose Gene (dagA) of Streptomyces coelicor A3(2): Nucleotide Sequence and Transcriptional Analysis," <u>Mol. Gen. Genet.</u> 209 :101-109 (1987); (previously considered in US 08/103,961, reference I.A.25)		
MKB	I.B.28.	Carman, et al., "Vaccine-Induced Escape Mutant of Hepatitis B Virus," <u>The Lancet</u> 336 :325-329 (1990); (previously considered in US 08/103,961, reference I.A.91)		
MKB	I.B.29.	Cashdollar, et al., "Cloning the double-stranded RNA genes of reovirus: Sequence of the cloned S2 gene," <u>Proc. Natl. Acad. Sci. USA</u> 79 :7644-7648 (1982); (previously considered in US 08/103,961, reference V.10)		
MKB	I.B.30.	Castle, et al., "Sequence Analysis of the Viral Core Protein and the Membrane-Associated Proteins V1 and NV2 of the Flavivirus West Nile Virus of and the Genome Sequence for these Proteins," <u>Virology</u> 145 :227-236 (1985); (previously considered in US 08/103,961, reference V.12)		
MKB	I.B.31.	Cha, et al., "At Least Five Related, But Distinct, Hepatitis C Viral Genotypes Exist," <u>Proc. Natl. Acad. Sci. USA</u> 89 :7144-7148 (1992); (previously considered in US 08/103,961, reference I.A.26)		
MKB	I.B.32.	Choo, et al., "Hepatitis C Virus: The Major Causative Agent of Viral Non-A, Non-B Hepatitis," <u>Brit. Med. Bulletin</u> 46 (2):423-441 (1990); (previously considered in US 07/456,637, reference JL; and US 08/103,961, reference I.B.80)		
MKB	I.B.33.	Choo, et al., "Isolation of cDNA Clone Derived from a Blood-Borne Non-A, Non-B Viral Hepatitis Genome," <u>Science</u> , 244 :359-362 (1989); (previously considered in US 07/456,637,		

EXAMINER: <i>MKB</i>	DATE CONSIDERED: <i>7/3/97</i>
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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
		reference IT and EEO; and US 08/103,961, reference I.B.84)
MKZ	I.B.34.	Coia, et al., "Nucleotide and Complete Amino Acid Sequences of Kunjin Virus: Definitive Gene Order and Characteristics of the Virus-specified Proteins," <u>J. Gen. Virol.</u> 69 :1-21 (1988); (previously considered in US 08/103,961, reference V.24)
MKZ	I.B.35.	Coursaget, et al., "Virus-Like Particles Associated with Non-A, Non-B Hepatitis," <u>The Lancet</u> , 14 July 1979, p. 92; (previously considered in US 07/456,637, reference BO; and US 08/103,961, reference I.B.88)
MKZ	I.B.37.	Dalgarno, et al., "Ross River Virus 26 S RNA: Complete Nucleotide Sequence and Deduced Sequence of the Encoded Structural Proteins," <u>Virology</u> 129 :170-187 (1983); (previously considered in US 08/103,961, reference I.A.29)
MKZ	I.B.38.	Dalgarno, et al., "Partial nucleotide sequence of the Murray Valley encephalitis virus genome. Comparison of the encoded polypeptides with Yellow Fever virus structural and non-structural proteins," <u>J. Mol. Biol.</u> 187 :309-323 (1986); (previously considered in US 08/103,961, reference V.13)
MKZ	I.B.39.	Davis, et al., "Isolation of cDNA Clones for Differentially Expressed Genes of the Human Parasite <i>Schistosoma mansoni</i> ," <u>Proc. Natl. Acad. Sci. USA</u> 83 :5534-5538 (1986); (previously considered in US 08/103,961, reference I.A.30)
MKZ	I.B.40.	Denniston, et al., "Cloned Fragment of the Hepatitis Delta Virus RNA Genome: Sequence and Diagnostic Application," <u>Science</u> 232 :873-875 (1986); (previously considered in US 08/103,961, reference V.14)
MKZ	I.B.41.	Deubel, et al., "Nucleotide Sequence and Deduced Amino Acid Sequence of the Structural Proteins of Dengue Type 2 Virus, Jamaica Genotype," <u>Virology</u> 155 :365-377 (1986); (previously considered in US 08/103,961, reference V.22)
MKZ	I.B.42.	Dienstag, et al., "Non-A, Non-B Hepatitis: Evolving Epidemiologic and Clinical Perspectives," <u>Seminars in Liver Disease</u> 6 (1):67-81 (1986); (previously considered in US 08/103,961, reference I.A.31)
MKZ	I.B.43.	Dienstag, et al., "Circulating Immune Complexes in Non-A, Non-B Hepatitis," <u>Lancet</u> 1 :1265-1267 16 June 1979; (previously considered in US 07/456,637, reference QR; and US 08/103,961, reference I.B.107)
MKZ	I.B.44.	Donelson, et al., "Construction of <i>Onchocerca volvulus</i> cDNA libraries and partial characterization of the cDNA for a major antigen," <u>Mol. Biochem. Parasitol.</u> 31 :241-250 (1988); (previously considered in US 08/103,961, reference V.5)
MKZ	I.B.45.	Druilhe, et al., "Species-and Stage-specific antigens in exoerythrocytic stages of <i>Plasmodium falciparum</i> ," <u>Am. J. Trop. Med. Hyg.</u> 33 (3):336-341 (1984); (previously considered in US 08/103,961, reference V.28)
MKZ	I.B.46.	Edwards, <u>Immunoassay: An Introduction</u> (London, 1985); (previously considered in US 08/103,961, reference I.A.32)
MKZ	I.B.47.	Ezzell, "Candidate Cause Identified of Non-A, Non-B Hepatitis," <u>Nature</u> 333 :195 (1988);
EXAMINER: <u>MKZ</u>	DATE CONSIDERED: <u>7/3/97</u>	
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Examiner Initials	Ref. No.	Title	
		(previously considered in US 07/456,637, reference FP; and US 08/103,961, reference I.B.114)	
MKZ	I.B.48.	Faragher, Ph.D. thesis, "Sequence Studies on Natural and Laboratory-Derived Virulence Variants of Ross River Virus," <u>Australian National University Lab</u> March 1987; (previously considered in US 08/103,961, reference I.A.33, and VI.29)	
MKZ	I.B.49.	Faragher, et al., "Analysis of Ross River Virus Genomic RNA Using <i>Hae</i> III Digests of Single-Stranded cDNA to Infected-Cell RNA and Virion RNA," <u>Virology</u> 141 :248-256 (1985); (previously considered in US 08/103,961, reference I.A.34)	
MKZ	I.B.50.	Faragher, et al., "Genome Sequences of a Mouse-Avirulent and a Mouse-Virulent Strain of Ross River Virus," <u>Virology</u> 163 :509-526 (1988); (previously considered in US 08/103,961, reference I.A.35)	
MKZ	I.B.51.	Feinstone, et al., "Evidence for Non-A, Non-B Viruses," <u>Viral Hepatitis and Delta Infection</u> , pp. 29-39 (1983); (previously considered in US 08/103,961, reference I.A.36)	
MKZ	I.B.54.	Glover, (ed.), <u>DNA Cloning Techniques: A Practical Approach</u> , (1985), IRL Press, Oxford; (previously considered in US 08/103,961, reference I.A.41)	
MKZ	I.B.55.	Goelet, et al., "Nucleotide sequence of tobacco mosaic virus RNA," <u>Proc. Natl. Acad. Sci. USA</u> 79 :5818-5822 (1982); (previously considered in US 08/103,961, reference V.9)	
MKZ	I.B.56.	Guerin-Marchand, "A Liver-Stage-Specific Antigen of <i>Plasmodium Falciparum</i> Characterized by Gene Cloning," <u>Nature</u> 329 :164-167 (1987); (previously considered in US 07/456,637, reference FFN; and US 08/103,961, reference I.B.143)	
MKZ	I.B.57.	Hakim, "Isolation and Functional Property of mRNA Coding for Hepatitis A, B and Non-A, Non-B Viral Particles from Human Sera," <u>Naturwissenschaften</u> 73 :45-47 (1986); (previously considered in US 07/456,637, reference HS; and US 08/103,961, reference I.B.147)	
MKZ	I.B.58.	Hahn, et al., "Nucleotide Sequence of Dengue 2 RNA and Comparison of the Encoded Proteins with Those of Other Flaviviruses," <u>Virology</u> 162 :167-180 (1988); (previously considered in US 08/103,961, reference V.18)	
MKZ	I.B.59.	Hardy, (ed.), <u>Plasmids: A Practical Approach</u> , (IRL Press, Oxford); (previously considered in US 08/103,961, reference I.A.42)	
MKZ	I.B.60.	He, et al., "Determining the Size of Non-A, Non-B Hepatitis Virus by Filtration," <u>J. Infect. Dis.</u> 156 (4):636-640 (1987); (previously considered in US 07/191,263 (paper no. 5) and US 07/456,637, reference FM; and US 08/103,961, reference I.B.154)	
MKZ	I.B.62.	Hollinger, et al., "Transfusion-Transmitted viruses study: Experimental evidence for Two Non-A, Non-B Hepatitis Agents," <u>J. Infect Dis.</u> 142 (3):400-407 (1980); (previously considered in US 08/103,961, Reference V.25)	
MKZ	I.B.63.	Houghton, et al., "Molecular Biology of the Hepatitis C Viruses: Implications for Diagnosis, Development and Control of Viral Disease," <u>Hepatology</u> 14 (2):381 (1991); (previously considered in US 08/103,961, reference I.A.47)	
EXAMINER: MKZ		DATE CONSIDERED: 7/3/97	
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OTHER DOCUMENTS (including author, title, Date, Pertinent Pages, Etc.)		
Examiner Initials	Ref. No.	Title
MKB	I.B.66.	Huyhn, et al., "Constructing and Screening cDNA Libraries in Σ gt10 and Σ gt11," <u>DNA Cloning: A Practical Approach</u> , Vol. 1, Chpt. 2, pp. 49-78 (Glover, ed.); (previously considered in US 08/103,961, reference I.A.95)
MKB	I.B.67.	Imai, et al., "Molecular cloning of double-stranded RNA virus genomes," <u>Proc. Natl. Acad. Sci. USA</u> 80 :373-377 (1983); (previously considered in US 08/103,961, reference V.11)
MKB	I.B.68.	Kemp, et al., "Expression of <i>Plasmodium falciparum</i> Blood-Stage Antigens in <i>Escherichia coli</i> : Detection with Antibodies from Immune Humans," <u>Proc. Natl. Acad. Sci. USA</u> 80 :3787-3791 (1983); (previously considered in US 08/103,961, reference I.A.52)
MKB	I.B.69.	Knodell, et al., "Development of Chronic Liver Disease After Acute Non-A, Non-B Post-Transfusion Hepatitis, Role of K-Globulin prophylaxis in its Prevention," <u>Gastroenterology</u> 72 (5):902-909 (1977); (previously considered in US 08/103,961, reference V.26)
MKB	I.B.70.	Kubo, et al., "A cDNA Fragment of Hepatitis C Virus Isolated from an Implicated Donor of post-transfusion non-A, non-B hepatitis in Japan," <u>Nucl. Acids Res.</u> 17 (24):10367-10372 (1989); (previously considered in US 07/456,637, reference JP; and US 08/103,961, reference I.B.187)
MKB	I.B.71.	Lopez, et al., "Cloning of the I Chain of Human Platelet Glycoprotein Ib: A Transmembrane Protein with Homology to Leucine-Rich I2-Glycoprotein," <u>Proc. Natl. Acad. Sci. USA</u> 84 :5615-5619 (1987); (previously considered in US 08/103,961, reference I.A.56)
MKB	I.B.72.	Mackow, et al., "The Nucleotide Sequence of Dengue Type 4 Virus: Analysis of Genes Coding for Nonstructural Proteins," <u>Virology</u> 159 (2):217-228 (1987); (previously considered in US 08/103,961, reference V.23)
MKB	I.B.73.	Mandl, et al., "Genome Sequence of Tick-Borne Encephalitis Virus (Western Subtype) and Comparative Analysis of Nonstructural Proteins with Other Flaviviruses," <u>Virology</u> 173 :291-301 (1989); (previously considered in US 08/103,961, reference V.19)
MKB	I.B.75.	Miller, et al., "Hepatitis C virus shares amino acid sequence similarity with pestiviruses and flaviviruses as well as members of two plant virus supergroups," <u>Proc. Natl. Acad. Sci. USA</u> 87 :2057-2061 (1990); (previously considered in US 08/103,961, reference V.27)
MKB	I.B.77.	Molenaar, et al., "Structure and Organization of Two Links Ribosomal Protein Genes in Yeast," <u>Nucleic Acids Res.</u> 12 (19):7345 (1984); (previously considered in US 08/103,961, reference I.A.59)
MKB	I.B.80.	Nakada, et al., "Complete Nucleotide Sequence of the Influenza C/California/78 Virus Nucleoprotein," <u>Virus Res.</u> 1 :433-441 (1984); (previously considered in US 08/103,961, reference I.A.62)
MKB	I.B.81.	Neurath, et al., "Strategies for Detection of Transfusion-Transmitted Viruses Eluding

EXAMINER: <u>MKB</u>	DATE CONSIDERED: <u>23/97</u>
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OTHER DOCUMENTS (including author, title, Date, Pertinent Pages, Etc.)			
Examiner Initials	Ref. No.	Title	
MKB		Identification by Conventional Serologic Tests. II) Detection of Host DNA in Human Plasmas with Elevated Alanine Aminotransferase," <u>J. Virol. Meth.</u> 8 :73-86 (1984); (previously considered in US 07/191,263 (paper no. 5) and US 07/456,637, reference ZP, HR; and US 08/103,961, reference I.B.221)	
MKB	I.B.82.	Oellerich, "Enzyme-Immunoassay: A Review," <u>J. Clin. Chem. Clin. Biochem.</u> 22 :895-904 (1984); (previously considered in US 07/456,637, reference R paper 13; and US 08/103,961, reference I.B.225)	
MKB	I.B.83.	Okamoto, et al., "Full-Length Sequence of a Hepatitis C Virus Genome Having Poor Homology to Reported Isolates: Comparative Study of Four Distinct Genotypes," <u>Virol.</u> 188 :331-341 (1992); (previously considered in US 08/103,961, reference I.A.64 and VI.28)	
MKB	I.B.84.	Old & Primrose, <u>Principles of Old & Primrose, Principles of Gene Manipulation, 3rd Ed.</u> (1985) Blackwell Scientific Publication, p. 113; (previously considered in US 08/103,961, reference I.A.65)	
MKB	I.B.85.	O'Sullivan, "Clinical and Biochemical Analysis," <u>Enzyme Immunoassay</u> , Vol. 14 , Chpt. 3 (1984); (previously considered in US 08/103,961, reference I.A.66)	
MKB	I.B.86.	Overby, "Serology of Liver Diseases," <u>Current Hepatology</u> 7 :35-67 (1987); (previously considered in US 07/456,637, reference BM; and US 08/103,961, reference I.B.231)	
MKB	I.B.89.	Prince, et al., "Hepatitis C virus (HCV): Characterization of virus specific antigens and associated particles," <u>Gastroenterology</u> 77 (5):A33 (1979); (previously considered in US 07/456,637, reference ON; and US 08/103,961, reference I.B.245)	
MKB	I.B.90.	Prince, "Non-A, Non-B Hepatitis Viruses," <u>Ann. Rev. Microbiol.</u> 37 :217-232 (1983); (previously considered in US 07/456,637, reference CO; and US 08/103,961, reference I.B.250)	
MKB	I.B.92.	Rice, et al., "Nucleotide Sequence of Yellow Fever Virus: Implications for Flavivirus Gene Expression and Evolution," <u>Science</u> 229 :726-733 (1985); (previously considered in US 08/103,961, reference I.A.69)	
MKB	I.B.93.	Rice, et al., "Nucleotide sequence of the 26S mRNA of Sindbis virus and deduced sequence of the encoded virus structural proteins," <u>Proc. Natl. Acad. Sci. USA</u> 78 (4):2062-2066 (1981); (previously considered in US 08/103,961, reference V.7)	
MKB	I.B.94.	Rice, et al., "Synthesis, Cleavage and Sequence Analysis of DNA Complementary to the 26 S Messenger RNA of Sindbis Virus," <u>J. Mol. Biol.</u> 150 :315-340 (1981); (previously considered in US 08/103,961, reference V.8)	
MKB	I.B.95.	Robinson, et al., "The Enigma of Non-A, Non-B Hepatitis" <u>J. Infect. Dis.</u> 145 (3):387-395 (1982); (previously considered in US 08/103,961, reference V.2)	
MKB	I.B.96.	Scallan, et al., "Cloning of a <i>Schistosoma japonicum</i> Gene Encoding a Major Immunogen Recognized by Hyperinfected Rabbits," <u>Mol. Biochem. Parasitol.</u> 24 :237-245 (1987);	

EXAMINER:	<u>MKB</u>	DATE CONSIDERED:	2/3/97
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Examiner Initials	Ref. No.	Title	
		(previously considered in US 08/103,961, reference I.A.73)	
MKB	I.B.97.	Schuurs, et al., "Enzyme Immunoassay," <u>Clin. Chim. ACTA</u> 81 :1-40 (1977); (previously considered in US 08/103,961, reference I.A.74)	
MKB	I.B.99.	Seikagaku Jiten, "Antigen Determinant," <u>Dictionary of Biochemistry</u> , 1st Ed. p. 435 (1984); (previously considered in US 08/103,961, reference I.A.75)	
MKB	I.B.101.	Seto, et al., "Detection of Reverse Transcriptase Activity in Association with the Non-A, Non-B Hepatitis Agent(s)," <u>The Lancet</u> 8409 :941-943 (1984); (previously considered in US 07/456,637, reference DN; and US 08/103,961, reference I.B.271)	
MKB	I.B.103.	Shih, et al., "Non-A, Non-B Hepatitis: Advances and Unfulfilled Expectations of the First Decade," <u>Prog. in Liver Diseases</u> , Vol. VIII (Grune & Stratton, publ.), Chpt. 24, pp. 433-452; (previously considered in US 08/103,961, reference I.A.79)	
MKB	I.B.105.	Shimizu, et al., "Non-A, Non-B Hepatitis: Ultrastructural Evidence for Two Agents in Experimentally Infected Chimpanzees," <u>Science</u> 205 :197-200 (1979); (previously considered in US 07/456,637, reference OS; and US 08/103,961, reference I.B.281)	
MKB	I.B.106.	Shirachi, et al., "Hepatitis "C" antigen in Non-A, Non-B post-transfusion hepatitis," <u>The Lancet</u> 8095 :853-856 (1978); (previously considered in US 07/456,637, reference OO; and US 08/103,961, reference I.B.282)	
MKB	I.B.107.	Stahl, et al., "Differential Antibody Screening of Cloned <i>Plasmodium falciparum</i> Sequences Expressed in <i>Escherichia coli</i> : Procedure for Isolation of Defined Antigens and Analysis of Human Antisera," <u>Proc. Natl. Acad. Sci. USA</u> 81 :2456-2460 (1984); (previously considered in US 08/103,961, reference I.A.80)	
MKB	I.B.108.	Strauss, et al., "Replication of Alphaviruses and Flaviviruses: Proteolytic Processing of Polyproteins," <u>Positive Strand RNA Viruses</u> (Alan Liss, Inc. 1987) pp. 209-225; (previously considered in US 08/103,961, reference V.30)	
MKB	I.B.109.	Sumiyoshi, et al., "Complete Nucleotide Sequence of the Japanese Encephalitis Virus Genome RNA," <u>Virology</u> 161 :497-510 (1987); (previously considered in US 08/103,961, reference V.16)	
MKB	I.B.110.	Tabor, et al., "Detection of an Antigen-Antibody System in Serum Associated with Human Non-A, Non-B Hepatitis," <u>J. Med. Virol.</u> 4 :161-169 (1979); (previously considered in US 07/456,637, reference RL; and US 08/103,961, reference I.B.296)	
MKB	I.B.111.	Taylor, et al., "Efficient Transcription of RNA into DNA by avian sarcoma virus polymerase," <u>Biochim. Biophys. Acta</u> 442 :324-330 (1976); (previously considered in US 08/103,961, reference V.6)	
MKB	I.B.112.	Trent, et al., "Partial Nucleotide Sequence of St. Louis Encephalitis Virus RNA: Structural Proteins, NS1, ns2a, and ns2b," <u>Virology</u> 156 :293-304 (1987); (previously considered in US 08/103,961, reference V.17)	
MKB	I.B.115.	Van der Poel, et al., "Confirmation of Hepatitis C Virus Infected by New Four-Antigen	

EXAMINER: <u>MKB</u>	DATE CONSIDERED: <u>7/2/97</u>
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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
		Recombinant Immunoblot Assay," <u>The Lancet</u> 337 :317-319 (1991); (previously considered in US 07/456,637, reference KS; and US 08/103,961, reference I.B.331)
<i>MKB</i>	I.B.117.	Vogel, et al., "Production of a recombinant antigen of Echinococcus multilocularis with high immunodiagnostic sensitivity and specificity," <u>Mol. Biochem. Parasitol.</u> 31 :117-126 (1988); (previously considered in US 08/103,961, reference V.4)
<i>MKB</i>	I.B.118.	Vrati, et al., "Ross River Virus Mutant with a Deletion in the E2 Gene: Properties of the Virion, Virus-Specific Macromolecule Synthesis and Attenuation of Virulence for Mice," <u>Virology</u> 151 :222-232 (1986); (previously considered in US 08/103,961, reference I.A.84 and VI.29)
<i>MKB</i>	I.B.119.	Wang, et al., "Structure, sequence and expression of hepatitis delta (Λ) viral genome," <u>Nature</u> 323 :508-514 (1986); (previously considered in US 07/191,263 (paper no. 5) and US 07/456,637, reference OM; and US 08/103,961, reference I.B.345)
<i>MKB</i>	I.B.120.	Weiner, et al., "Hepatitis Delta (Λ) cDNA Clones: Undetectable Hybridization to Nucleic Acids from Infectious Non-A, Non-B Hepatitis Materials and Hepatitis B DNA," <u>J. Med. Virol.</u> 21 :239-247 (1987); (previously considered in US 07/456,637, reference HT; and US 08/103,961, reference I.B.350)
<i>MKB</i>	I.B.121.	Weiner, et al., "HCV: Detection of Hepatitis C Viral Sequences in Non-A, Non-B Hepatitis," <u>The Lancet</u> 335 :1-3 (1990); (previously considered in US 07/456,637, reference LL; and US 08/103,961, reference I.B.353)
<i>MKB</i>	I.B.122.	Wengler, et al., "Analysis of Structural Properties which Possibly Are Characteristic for the 3'-Terminal Sequence of the Genome RNA of Flaviviruses," <u>J. Gen. Virol.</u> 67 :1183-1188 (1986); (previously considered in US 08/103,961, reference V.21)
<i>MKB</i>	I.B.123.	Yaegashi, et al., "Partial Sequence Analysis of Cloned Dengue Virus Type 2 Genome," <u>Gene</u> 46 :257 (1986); (previously considered in US 08/103,961, reference I.A.89)
<i>MKB</i>	I.B.124.	Young, et al., "Efficient Isolation of Genes by Using Antibody Probes," <u>Proc. Natl. Acad. Sci. USA</u> 80 :1194-1198 (1983); (previously considered in US 07/456,637, reference FFM cited by the examiner in paper 23; and US 08/103,961, reference I.B.358)
<i>MKB</i>	I.B.125.	Young, et al., "Yeast RNA polymerase II genes: Isolation with antibody probes," <u>Science</u> 222 :778-782 (1983); (previously considered in US 08/103,961, reference I.B.359)
<i>MKB</i>	I.B.126.	Newswatch 5 :8 (1985) (previously considered in US 07/456,637, reference DT; US 08/103,961, reference I.B.11)
<i>MKB</i>	I.B.127.	<u>The New York Times</u> , Friday, April 21, 1989, p. 1 (previously considered in US 07/456,637, reference NN; US 08/103,961, reference I.B.10)
<i>MKB</i>	I.B.128.	Martin, et al., <u>Arch. of Virol.</u> 61 :87-103 (1979) (ref. 52); (previously considered in US 08/103,961, reference III.A.227 and VI.24)
<i>MKB</i>	I.B.129.	Sewell, et al., <u>Proc. Natl. Acad. Sci. USA</u> 83 :8718-8722 (1986) (ref. 18); (previously considered in US 08/103,961, reference III.A.198 and VI.16)
EXAMINER:	DATE CONSIDERED: <i>MKB</i> 7/3/97	
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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>			
Examiner Initials	Ref. No.	Title	
MKB	I.B.130.	Zhao, et al., <u>Virology</u> 155:77-88 (1986) (ref. 31); (previously considered in US 08/103,961, reference V.15)	
MKB	I.B.131.	Letter dated October 16, 1989, from Mr. Lanman at the NIH to Robert Blackburn at Chiron; (previously considered in US 08/103,961, reference I.A.106)	
	I.B.132.	Opinion of Professor Donald Chisum June 1991; (previously considered in US 08/103,961, reference I.A.107)	
	I.B.133.	"Agreement of Settlement" dated April 3, 1990 between Chiron Corporation and the Centers for Disease Control; (previously considered in US 08/103,961, reference I.A.108)	
	I.B.134.	"Independent Legal Opinion Concerning Hepatitis C Inventorship Dispute", June 1991; (previously considered in US 08/103,961, reference I.A.109)	
	I.B.135.	Memorandum Re Interviews of Dr. Qui-Lim Choo and Dr. George Kuo dated May 8, 1991; (previously considered in US 08/103,961, reference I.A.110)	
	I.B.136.	Memorandum Re Interview of Dr. Michael Houghton dated May 8, 1991; (previously considered in US 08/103,961, reference I.A.111)	
	I.B.137.	Memorandum Re Interview of Dr. Daniel Bradley dated April 11, 1991; (previously considered in US 08/103,961, reference I.A.112)	
	I.B.138.	Memorandum Re Interviews of Dr. Amy Weiner and Dr. Gary Van Nest dated April 30, 1993; (previously considered in US 08/103,961, reference I.A.113)	
	I.B.139.	Memorandum Re Interview of Dr. Lacy Overby dated June 21, 1991; (previously considered in US 08/103,961, reference I.A.114)	
	I.B.140.	Memorandum dated November 11, 1987 by Dr. Michael Houghton; (previously considered in US 08/103,961, reference I.A.115)	
	I.B.141.	Memorandum by Dr. Michael Houghton (undated); (previously considered in US 08/103,961, reference I.A.116)	
	I.B.142.	Chiron Laboratory Notebook #1298, pp. 184-190, 192 (November, 1986); (previously considered in US 08/103,961, reference I.A.117)	
	I.B.143.	Memorandum by Dr. Houghton, dated November 10, 1987; (previously considered in US 08/103,961, reference I.A.118)	
↓	I.B.144.	Inventorship Opinion of Gladys Monroy dated June 7, 1988; (previously considered in US 08/103,961, reference I.A.119)	
MKB	I.B.145.	Letter dated October 16, 1989 from Mr. Lanman of the NIH to Robert Blackburn of Chiron Corporation	
MKB	I.B.146.	Bradley, et al., <u>Prog. Med. Virol.</u> 37:101-135 (1990) (cited by the examiner in 07/456,637, paper 23; and 08/103,961, reference I.B.61)	
MKB	I.B.147.	Weiner, et al., <u>J. Virol.</u> 62(2):594-599 (1988); (previously considered in US 07/122,174,	

EXAMINER:	<i>MKB</i>	DATE CONSIDERED: 7/3/97
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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
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		07/139,886, 07/161,072, 07/191,263; and US 08/103,961, reference I.B.354)
MKZ	I.B.148.	Choo, et al., Genetics, Organization and diversity of the Hepatitis C virus," <u>Proc. Natl. Acad. Sci. USA</u> 88 :1-5 (1991); (previously considered in US 07/456,637, reference I.B.83)
MKZ	I.B.149.	<u>Proc. Japan Acad.</u> , 65 , ser.V. No.9, pp.219-223 (1989)
MKZ	I.B.151.	<u>Methods in Enzymology</u> vol. 155, part F (1987) (previously considered in US 08/103,961, reference I.A.12)
MKZ	I.B.152.	Bradley, "Non-A/Non-B Hepatitis in Experimentally Infected Chimpanzees: Cross Challenge and Electron Microscopic Studies," <u>J Med Virol</u> 6 :185-201 (1980); (previously considered in US 07/456,637, reference I.B.57)
MKZ	I.B.154.	Dialog Computer Printout (previously considered in US 08/103,961, reference V.3)
MKZ	I.B.155.	Alter, "Transfusion-Associated Non-A, Non-B Hepatitis: The First Decade," <u>Viral Hepatitis and Liver Disease</u> , (Zuckermann, Ed.) p.537; (Considered in US 08/103,961, reference I.A.3)
MKZ	I.B.156.	Arima, et al., "Cloning of Serum RNA Associated with Hepatitis C Infection Suggesting Heterogeneity of the Agent(s) Responsible for Infection," <u>Chemical Abstract</u> , 112(11) :441 (1990); (Considered in US 08/103,961, reference I.A.6)
MKZ	I.B.157.	Arima, "Cloning of a cDNA Associated with Acute and Chronic Hepatitis C Infection Generated from Patients Serum RNA," <u>Chem. Abstract</u> , 112(1) :209 (1990); (Considered in US 08/103,961, reference I.A.7)
MKZ	I.B.158.	Arima, "A Lambda gt11-cDNA Clone Specific for Chronic Hepatitis C Generated from Pooled Serum Presumably Infected by Hepatitis C Virus," <u>Chem. Abstract</u> , 112(7) :169 (1990); (Considered in US 08/103,961, reference I.A.8)
MKZ	I.B.159.	Boender, et al., "Fragmented Chromosomal DNA in Sera of Patients with Hepatitis A, B, and Non-A, Non-B," <u>Viral Hepatitis and Liver Disease</u> (Zuckerman, ed.) pp. 588-591 (1988); (Considered in US 08/103,961, reference I.A.13)
MKZ	I.B.160.	Bradley, et al., "Non-A, Non-B Hepatitis in Experimentally Infected Chimpanzees:Comparative Morphology of Virus-Induced Ultrastructural Changes," <u>Hepatitis Viruses and Hepatocellular Carcinoma</u> , pp. 226-260 (1985); (Considered in US 08/103,961, reference I.A.14)
MKZ	I.B.161.	Brotman, et al., "Interference Between Non-A, Non-B and Hepatitis B Virus Infection in Chimpanzees," <u>J. Med. Vir.</u> , 11 :191-205 (1983); (Considered in US 08/103,961, reference I.A.20)
MKZ	I.B.164.	Neurath, et al., "An Antigen Detected Frequently in Human Sera with Elevated Levels of Alanine Aminotransferase:A Potential Marker for Non-A, Non-B Hepatitis," <u>J. Gen. Virol.</u> , 48 :285-295 (1980); (Considered in US 07/456,637, reference SQ; and US 08/103,961, reference I.B.220)

EXAMINER: <u>Mary KZ</u>	DATE CONSIDERED: <u>7/3/97</u>
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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
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MKB	I.B.165.	Shimizu, et al., "Production of Antibody Associated with Non-A, Non-B Hepatitis In A Chimpanzee Lymphoblastoid Cell Line Established by in vitro Transformation with Epstein-Barr Virus," <u>Proc. Natl. Acad. Sci. USA</u> , 82 :2138-2142 (1985); (Considered in US 07/456,637, reference HL; and US 08/103,961, reference I.B.280)
MKB	I.B.166.	Shimizu, et al., "Further Studies by Immunofluorescence of the Monoclonal Antibodies Associated with Experimental Non-A, Non-B Hepatitis in Chimpanzees and Their Relation to Delta Hepatitis," <u>Hepatology</u> , 6 :1329-1333 (1986); (Considered in US 07/456,637, reference HN; and US 08/103,961, reference I.B.278)
MKB	I.B.167.	Prince, et al., "Isolation of a Virus from Chimpanzee Liver Cell Cultures Inoculated with Sera Containing the Agent of Non-A, Non-B Hepatitis," <u>The Lancet</u> , 10 November 1984, pp. 1071-1075; (Considered in US 07/456,637, reference DO; and US 08/103,961, reference I.B.248)
MKB	I.B.168.	Arima, et al., "Serum RNA Associated with Blood-Transmitted Non-A, Non-B Hepatitis," <u>Hepatology</u> , 8 :1275 (1988); (Considered in US 07/456,637, reference CCO; and US 08/103,961, reference I.B.34)
MKB	I.B.169.	Arima, et al., "Cloning of Serum RNA Associated with Hepatitis C Infection Suggesting Heterogeneity of the Agent(s) Responsible for Infection," <u>Gastroenterol. Jpn.</u> , 25(6) :685-691 (1989); (Considered in US 07/456,637, reference IM; and US 08/103,961, reference I.B.32)
MKB	I.B.170.	Bradley, et al., "Non-A, Non-B Hepatitis in Experimentally Infected Chimpanzees: Comparative Morphology of Virus-Induced Ultrastructural Changes," <u>Academic Press Japan</u> , (1985); (Considered in US 07/456,637, reference EEN; and US 08/103,961, reference I.B.47)
MKB	I.B.171.	Bradley, et al., "Non-A, Non-B Hepatitis: Research Progress and Current Perspectives," <u>Dev. Biol. Standard</u> , 54 :63-73 (1983); (Considered in US 07/456,637, reference EEM; and US 08/103,961, reference I.B.49)
MKB	I.B.172.	Bradley, et al., "Parenterally Transmitted Non-A, Non-B Hepatitis Virus-Specific Antibody Response Patterns in Hepatitis C Virus-Infected Chimpanzees," <u>Gastroenterology</u> , 99 :1054-1060 (1990); (Considered in US 07/456,637, reference LM; and US 08/103,961, reference I.B.50)
MKB	I.B.173.	Bradley, et al., "Transmission of Non-A, Non-B Hepatitis to Chimpanzees: Recovery of Virus-Like Particles," <u>Abstr. Ann. Mtg. Am. Soc. Microbiol.</u> , 79 :267 (1979); (Considered in US 07/456,637, reference QQ; and US 08/103,961, reference I.B.46)
MKB	I.B.174.	Bradley, et al., "Aetiological Agent of Enterically Transmitted Non-A, Non-B Hepatitis," <u>J. Gen. Virol.</u> , 69 :731-738 (1988); (Considered in US 07/456,637, reference CCP; and US 08/103,961, reference I.B.52)
MKB	I.B.175.	Bradley, et al., "Non-A, Non-B Hepatitis in Chimpanzees: Interference with Acute Hepatitis A Virus and Chronic Hepatitis B Virus Infections," <u>J. Med. Virol.</u> , 11 :207-213

EXAMINER: <u>MKB</u>	DATE CONSIDERED: 7/3/97
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Form PTO-1449	Docket Number: 0063.024	Application Number: 08/441,443
INFORMATION DISCLOSURE CITATION IN AN APPLICATION <i>(Use several sheets if necessary)</i>		Applicant Houghton, et al.
	Filing Date: May 15, 1995	Group Art Unit: 1815

OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
		(1983); (Considered in US 07/456,637, reference GR; and US 08/103,961, reference I.B.53)
MKB	I.B.176.	Bradley, et al., "Persistent Non-A, Non-B Hepatitis in Experimentally Infected Chimpanzees," <u>J. Infect. Dis.</u> , 143 :210-218 (1981); (Considered in US 07/456,637, reference EEK; and US 08/103,961, reference I.B.54)
MKB	I.B.177.	Bradley, et al., "Viroids and Viral Hepatitis in Marmosets," <u>Nature</u> , 248 :172 (1974); (Considered in US 07/456,637, reference PT; and US 08/103,961, reference I.B.58)
MKB	I.B.178.	Bradley, et al., "Guest Lecture: Recrudescence of Non-A, Non-B Hepatitis in Persistently Infected Chimpanzees," <u>Proc. Int'l Hepatitis Workshop</u> (undated); (Considered in US 07/456,637, reference EEL; and US 08/103,961, reference I.B.60)
MKB	I.B.179.	Bradley, et al., "Virus of Enterically Transmitted Non-A, Non-B Hepatitis," <u>The Lancet</u> , 9 April 1988, p. 819; (Considered in US 07/456,637, reference CCQ; and US 08/103,961, reference I.B.63)
MKB	I.B.180.	Brotman, et al., "Non-A, Non-B Hepatitis: Is There More Than A Single Blood-Borne Strain?," <u>J. Infect. Dis.</u> , 151 :618-625 (1985); (Considered in US 07/456,637, reference DP; and US 08/103,961, reference I.B.65)
MKB	I.B.181.	Dienstag, "Non-A, Non-B Hepatitis I Recognition, Epidemiology and Clinical Features," <u>Gastroenterology</u> , 85 :439-462 (1983); (Considered in US 07/456,637, reference AO; and US 08/103,961, reference I.B.104)
MKB	I.B.182.	Dienstag, "Non-A, Non-B Hepatitis II Experimental Transmission, Putative Virus Agents and Markers, and Prevention," <u>Gastroenterology</u> , 85 :743-768 (1983); (Considered in US 07/456,637, reference AP; and US 08/103,961, reference I.B.105)
MKB	I.B.183.	Hallam, "Non-A, Non-B Hepatitis: Reverse Transcriptase Activity?," <u>The Lancet</u> , 21 September 1985, p. 665; (Considered in US 07/456,637, reference EP; and US 08/103,961, reference I.B.148)
MKB	I.B.184.	Itoh, et al., "Lack of Detectable Reverse-Transcriptase Activity in Human and Chimpanzee Sera with a High Infectivity for Non-A, Non-B Hepatitis," <u>J. Gen. Virol.</u> , 67 :777 (1986); (Considered in US 07/456,637, reference ES; and US 08/103,961, reference I.B.167)
MKB	I.B.185.	Linke, et al., "Non-A, Non-B Hepatitis Infection Does Not Result in the Production of Abundant Poly-A-Containing Messenger RNAs," <u>Viral Hepatitis and Liver Disease</u> (Zuckerman, ed.) pp.564-567 (1988); (Considered in US 08/103,961, reference I.A.55)
MKB	I.B.186.	Alter, "Transfusion-Associated Non-A, Non-B Hepatitis: The First Decade," <u>J. Med. Virol.</u> , 21 :43A (1987); (Considered in US 07/456,637, reference BBQ; and US 08/103,961, reference I.B.22)
MKB	I.B.187.	Alter, et al., "Non-A, Non-B Hepatitis: Its Relationship to Cytomegalovirus, to Chronic Hepatitis and to Direct and Indirect Test Methods," <u>Viral Hepatitis, 1981 Int'l Symposium</u> , pp. 279-294 (1981); (Considered in US 07/456,637, reference GO; and US 08/103,961,

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OTHER DOCUMENTS <i>(including author, title, Date, Pertinent Pages, Etc.)</i>		
Examiner Initials	Ref. No.	Title
		reference I.B.26)
MKB	I.B.188.	Feinstone, et al., "Non-A, Maybe-B Hepatitis," <u>New England J. Med.</u> , 311 (3):185-189 (1973); (Considered in US 08/103,961, reference I.A.37)
MKB	I.B.189.	Fraenkel-Conrat, et al. (ed.), <u>The Viruses: The Togaviridae and Flaviviridae</u> (1986), Plenum Press); (Considered in US 08/103,961, reference I.A.39)
MKB	I.B.190.	Hellings, et al., "Transmission of Non-A, Non-B Hepatitis by Leucocyte Preparations," <u>Viral Hepatitis and Liver Disease</u> (Zuckerman, ed.), pp. 543-549 (1988); (Considered in US 08/103,961, reference I.A.43)
MKB	I.B.191.	Alter, et al., "Non-A, Non-B: Observations on the First Decade," <u>Viral Hepatitis and Liver Disease</u> (Vyas, et al. eds.) pp. 345-354 (1984); (Considered in US 07/456,637, reference PO; and US 08/103,961, reference I.B.25)
MKB	I.B.192.	Charney, et al., "Analysis by Hybridization with HBV DNA of Hepatocellular DNA from Patients with Chronic Non-A, Non-B Hepatitis," <u>Viral Hepatitis: 1981 International Symposium</u> (Szmuness, et al., eds. (pp. 656-657) 1985, Franklin Institute Press); (Considered in US 08/103,961, reference I.A.27)

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